



IN THE UNITED STATES PATENT AND TRADEMARK OFFICE  
BEFORE THE BOARD OF PATENT APPEALS AND INTERFERENCES

In re Application of:

Vogler et al.

Serial No.: 10/646,483

Group Art Unit: 1733

Filed: August 22, 2003

Examiner: John L. Goff II

For: CELLULOSE ESTER BASED PRODUCTS AND METHODS FOR MAKING THEM

Mail Stop AF  
Commissioner for Patents  
P. O. Box 1450  
Alexandria, VA 22313-1450

TRANSMITTAL OF REPLY BRIEF

In response to the Examiner's Answer dated June 25, 2007, Appellants respectfully submit herewith a Reply Brief pursuant to 37 C.F.R. § 41.41. Appellants also file herewith a Request for Oral Hearing, with the requisite fee. If there are any fees due in connection with the filing of this Reply Brief that are not enclosed herewith, please charge such fees to our Deposit Account No. 05-0221

Respectfully submitted,

Michael K. Carrier  
Registration No. 42,391

16 August 2007  
Date

Eastman Chemical Company  
P.O. Box 511  
Kingsport, Tennessee 37662  
Phone: (423) 229-4016  
FAX: (423) 229-1239

CERTIFICATE OF MAILING UNDER 37 CFR 1.8(a)

I hereby certify that this paper (along with any paper(s) referred to as being attached or enclosed) is being deposited with the United States Postal Service with sufficient postage as first class mail in an envelope addressed to: Mail Stop AF, Commissioner for Patents, P. O. Box 1450, Alexandria, VA 22313-1450.

Jodi L. Owenby  
Jodi L. Owenby

August 17, 2007  
Date



**IN THE UNITED STATES PATENT AND TRADEMARK OFFICE  
BEFORE THE BOARD OF PATENT APPEALS AND INTERFERENCES**

In re Application of:

Vogler et al.

Serial No.: 10/646,483

Group Art Unit: 1733

Filed: August 22, 2003

Examiner: John L. Goff II

For: CELLULOSE ESTER BASED PRODUCTS AND METHODS FOR MAKING THEM

Mail Stop AF  
Commissioner for Patents  
P. O. Box 1450  
Alexandria, VA 22313-1450

**REPLY BRIEF UNDER 37 C.F.R. § 41.41**

Pursuant to 37 C.F.R. § 41.41, Appellants present this Reply Brief in response to the Examiner's Answer dated June 25, 2007. Appellants file herewith a Request for Oral Hearing.

## **Table of Contents**

I.	Introduction	p. 3
II.	Argument in Reply	p. 5
III.	Evidence Appendix	p. 9

## **I. INTRODUCTION**

Appellants submit this Reply Brief to specifically address erroneous assertions set forth in the Examiner's Answer, and to briefly review the law of obviousness in view of the recent holding in *KSR Int'l Co. v. Teleflex, Inc.*, 127 S.Ct. 1727; 82 USPQ2d 1385 (2007), but without unduly repeating arguments or addressing matters already dealt with in the Appeal Brief.

### **A. Rejections maintained**

Despite the arguments presented in the Appeal Brief, the Office has maintained the following rejections: of claims 12-14 and 17-21 under 35 U.S.C. § 103(a) as being unpatentable over Cobb, U.S. Pat. No. 3,025,861, ("Cobb '861") in view of McIntosh, U.S. Pat. No. 1,631,750; of claims 1-5, 8, and 11 under 35 U.S.C. § 103(a) as being unpatentable over Cobb '861 in view of McIntosh and Pearman, U.S. Pat. No. 3,426,764; of claim 15 under 35 U.S.C. as being unpatentable over Cobb '861 and McIntosh as applied to claims 12-14 and 17-21, and further in view of Cobb et al., U.S. Pat. No. 3,106,501 ("Cobb et al. '501"); and of claim 9 under 35 U.S.C. § 103(a) as being unpatentable over Cobb '861, McIntosh, and Pearman as applied to claims 1-5, 8, and 11, and further in view of Cobb et al. '501.

### **B. Obviousness inquiry in light of *KSR Int'l Co. v. Teleflex, Inc.***

Several basic factual inquiries must be made in order to determine the obviousness or non-obviousness of claims of a patent application under 35 U.S.C. § 103. These factual inquiries, set forth in *Graham v. John Deere Co.*, 383 U.S. 1, 17, 148 USPQ 459, 467 (1966), require the Examiner to:

- (1) Determine the scope and content of the prior art;
- (2) Ascertain the differences between the prior art and the claims in issue;
- (3) Resolve the level of ordinary skill in the pertinent art; and
- (4) Evaluate evidence of secondary considerations.

The obviousness or non-obviousness of the claimed invention is then evaluated in view of the results of these inquiries. *Graham*, 383 U.S. at 17-18, 148 USPQ 467; see also *KSR Int'l Co. v. Teleflex, Inc.*, 127 S.Ct. 1727, 1734; 82 USPQ2d 1385, 1391 (2007).

Thus, in order to satisfy the initial burden of establishing a prima facie case of obviousness, the Examiner must first show that the prior art references teach or suggest all the claim limitations. *In re Royka*, 490 F.2d 981, 180 USPQ 580 (CCPA 1974). The Examiner must also show that there is some suggestion or motivation, either in the references or in the knowledge generally available to one of ordinary skill in the art, to modify or combine the references. *In re Rouffet*, 149 F.3d 1350, 47 USPQ2d 1453 (Fed. Cir. 1998). The Supreme Court, in the recent *KSR* case, recognized that a showing of "teaching, suggestion, or motivation" could provide helpful insight in determining whether the claimed subject matter is obvious under Section 103(a). *KSR*, 127 S.Ct. at 1740-1742.

In addition, the Supreme Court mandates that "[t]o facilitate review, this analysis [of whether there was an apparent reason to combine the known elements in the fashion claimed by the patent at issue] should be made explicit." *Id.* (citing *In re Kahn*, 441 F.3d 977, 988 (Federal Circuit, 2006) ("[R]ejections on obviousness grounds cannot be sustained by mere conclusory statements; instead, there must be some *articulated reasoning* with some *rational underpinning* to support the legal conclusion of obviousness") (emphasis added)).

Following the KSR decision, the Office issued a memorandum to its technology center directors on May 3, 2007, indicating that **"in formulating a rejection under 35 U.S.C. § 103(a) based upon a combination of prior art elements, it remains necessary to identify the reason why a person of ordinary skill in the art would have combined the prior art elements in the manner claimed."** (Emphasis in original).

## II. ARGUMENT IN REPLY

**A. With respect to the rejection of claims 12-14 and 17-21, the reasons articulated in the Examiner's Answer to combine Cobb '861 with McIntosh have no rational underpinning, the only compelling reason being found in Appellants' own disclosure.**

The Examiner's Answer asserted that it would have been obvious to form the paper of Cobb '861 coated with cellulose acetate, using the method of forming paper having cellulose acetate incorporated therein as shown by McIntosh, "such that the paper for wrapping the aggregation of fibers is *improved in moisture repellency and durability* and has the further advantage of *eliminating the step of coating the paper* with the cellulose acetate." Page 4, line 20 to page 5 line 3 (emphasis added). This assertion of obviousness is based on the characterization in the Examiner's Answer that McIntosh teaches at page 1, lines 4-40 that "incorporating the cellulose acetate into the paper *as opposed to coating the paper with a resin*, i.e. by impregnating the paper with the resin, intimately and uniformly disperses the cellulose acetate throughout the fibers of the paper as well as on the surface of the paper to form a *moisture repellant and durable* product with the further advantage of *not having to have a step of coating the paper with the resin* in a process of bonding with the paper." Page 4, lines 13-20 (emphasis added).

Appellants respectfully submit that there is no indication in either of the references cited, or in the art generally, that improving the moisture repellency and durability of the paper of Cobb '861 would be an advantage. While moisture repellency and durability are clearly reasons why the "paper product" of McIntosh was produced in the fashion indicated in McIntosh, that does not provide any reason, suggestion, or motivation to modify the paper of Cobb '861 in that fashion. Indeed, it is common knowledge that moisture repellency is a feature that interferes with a common function of most paper, that of receiving, absorbing, and retaining ink applied by a writing instrument such as a pen or a brush. Similarly, the function of the paper disclosed in the Pearman reference would likewise be destroyed if the

paper repelled moisture, since the paper of Pearman is intended for use as a filtration material (column 2, lines 12-15) that allows moisture to pass through it (column 2, lines 47-49). Because there is no indication in the references, or in the art generally, that providing moisture repellency and durability to the paper of Cobb '861 would be an advantage, Appellants submit that the reasons articulated in the Examiner's Answer have no rational underpinning.

Appellants respectfully submit further that a fair reading of page 1, lines 4-40 of McIntosh does not suggest that the process described is equivalent to preparing a "coating" as in Cobb '861, or as the word is commonly understood.

Applicants acknowledge the Examiner's indication at page 4 of the Examiner's Answer that Cobb '861 teaches "coating a side of the paper with cellulose acetate." This construction of Cobb is consistent with Appellants' understanding of the cited teachings. This is also consistent with the passage of Cobb '861, at page 1, lines 58-60, which states that an object of that invention is to provide "a simple but practical method of making improved wrapped type of filters of the class indicated." The invention is summarized in column 1, lines 61-63, as the use of a plug (filament-filter) wrap paper *coated with an adhesive* (emphasis added). There being no indication that elaborate techniques are required to obtain the coating of Cobb '861, one would expect that the ordinary meaning of "coating" was intended, for example as set out in *Webster's New World Dictionary*, Simon & Schuster, 1980, p. 272, in which the noun "coating" is defined as "a coat or layer over a surface." Similarly, the transitive verb "coat" is defined as "to provide or cover with a coat" or "to cover with a layer of something." *Id.* The intended meaning is confirmed by Fig. 1 of Cobb '861, in which the "adhesive coating over entire interior of wrap" is depicted as a discrete layer covering the interior surface of the wrap.

In contrast, Appellants note that the process of McIntosh is equated in that document not with "coating" but with "impregnation," and respectfully submit that the construction of the word "impregnate" proposed in the Examiner's Answer is inconsistent with commonly understood definitions of the word in this context. *Webster's New World Dictionary*, Simon & Schuster, 1980, p. 706, for example, defines "impregnate" variously as "to fertilize," "to make pregnant," or "to fill or saturate; to cause to be permeated." If any of the results suggested by these definitions could be achieved merely by coating paper, as taught in Cobb '861, one wonders why McIntosh would have gone to the trouble of the elaborate process quoted in the Examiner's Answer, set out beginning at page 1, line 60 and ending at page 2, line 9 of that document, and further discussed below, that involves incorporating a cellulose ester during paper processing, and afterward treating the paper at high temperatures and pressures in the presence of steam for an extended period of time.

Indeed, having equated "coating" with "impregnating" for the purpose of asserting that claims 12-14 and 17-21 are obvious in view of the combination of Cobb' 861 with McIntosh, the Examiner's Answer goes on to take the position, at page 9, lines 10-11, that "McIntosh teaches incorporating the ester into the

paper during manufacture is *preferable* to coating (emphasis added)." Appellants agree that the process of McIntosh is *different* than coating. Whether the process of McIntosh is *preferable* to coating would, of course, depend upon the intended use of the product.

As noted in the Appeal Brief, it is not Cobb '861 nor McIntosh which suggests that coating a paper with a cellulose ester may be, for some purposes, functionally equivalent with incorporating the ester into the paper during paper manufacture, but rather Appellants' own disclosure. Because the reasons for combining the references cited in the Examiner's Answer have no rational underpinning in the references, or in the art generally, but can be found only in Appellants' own disclosure, Appellants respectfully request that the rejection be overruled.

**B. McIntosh does not teach a paper product comprising pulp or rag fibers and cellulose acetate incorporated therein where the cellulose acetate functions as an adhesive**

Contrary to the statement in the Response to Argument portion of the Examiner's Answer, found on page 7, lines 17-18 of the Examiner's Answer, McIntosh does *not* teach a paper product comprising pulp or rag fibers and cellulose acetate incorporated therein *where the cellulose acetate functions as an adhesive*. Appellants respectfully submit that this statement is entirely unsupported by the record.

**C. There is no basis for the assertion that the paper product of McIntosh is analogous to the coated paper product taught by Cobb**

The Examiner's Answer, quoting McIntosh, beginning on page 10, second line from the bottom, asserts that "McIntosh teaches, The single sheets, if they are of the desired thickness are vulcanized per se, or a laminated product is built up by superimposing one sheet upon another until the requisite thickness is obtained. In either case, the heat and pressure step is accomplished in the same manner.' (emphasis added) and 'The sheets are placed between the heated platens of a suitable press whereby they are subjected to pressure such as one thousand pounds per square inch at a temperature of one hundred and twenty-five pounds of steam. This heat and pressure are maintained for a time sufficient to cause the cellulose ester to fuse throughout the fibrous mass and to flow completely over the surface forming a continuous coating." The Examiner goes on to conclude based on the cited passage that the paper thus formed is considered analogous to the paper product (2 and 3) of Figure 1 of Cobb '861.

There is no basis for the assertion that the two are analogous, nor indeed, what features they might be expected to have in common. *Webster's New World Dictionary*, Simon & Schuster, 1980, p. 1594, defines the noun "vulcanization" as "the process of treating crude rubber with sulfur or its compounds and subjecting it to heat in order to make it nonplastic and increase its strength and elasticity," but perhaps the alternative definition of "a process somewhat like this, for hardening some substance" is more helpful in the present instance. If the two are indeed analogous, one wonders why the inventors of

McIntosh would not simply have coated the paper product with the cellulose ester rather than incorporating it during paper processing, and afterward treating the paper at high temperatures and pressures in the presence of steam for an extended period of time. Appellants respectfully submit that there is no basis for the assertion that the paper product of McIntosh is analogous to the coated paper of Cobb '861, and submit that this assertion should be disregarded.

In view of the arguments set forth above, Appellants believe there is no proper basis for the rejection of the claims and request that the rejection of the claims be overruled.

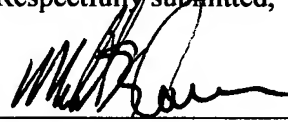


## **Evidence Appendix**

*Webster's New World Dictionary*, Second College Edition, Simon & Schuster, New York, 1980, cover page, definitions of "coating" and "coat" at p. 272, "impregnate" at p. 706, and "vulcanization" at p. 1594.

Eastman Chemical Company  
P.O. Box 511  
Kingsport, Tennessee 37662  
Phone: (423) 229-4016  
FAX: (423) 229-1239

Respectfully submitted,

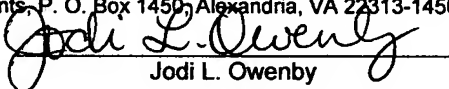


Michael K. Carrier  
Registration No. 42,391

16 August 2007  
Date

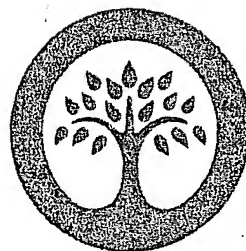
CERTIFICATE OF MAILING UNDER 37 CFR 1.8(a)

I hereby certify that this paper (along with any paper(s) referred to as being attached or enclosed) is being deposited with the United States Postal Service with sufficient postage as first class mail in an envelope addressed to: Mail Stop AF, Commissioner for Patents, P. O. Box 1450, Alexandria, VA 22313-1450.

  
Jodi L. Owenby

August 17, 2007  
Date

Michael J. Carr  
SECOND COLLEGE EDITION



# WEBSTER'S NEW WORLD DICTIONARY

OF THE AMERICAN LANGUAGE

DAVID B. GURALNIK, *Editor in Chief*

***Prentice-Hall***

---

SIMON AND SCHUSTER

ISBN 0-13-944637-0

Copyright © 1970, 1972, 1974, 1976, 1978, 1979, 1980 by Simon & Schuster, a Division of  
Gulf & Western Corporation

All rights reserved  
including the right of reproduction  
in whole or in part in any form

Published by New World Dictionaries/Simon and Schuster  
A Simon & Schuster Division of Gulf & Western Corporation  
Simon & Schuster Building

Rockefeller Center  
1230 Avenue of the Americas  
New York, New York 10020

SIMON and SCHUSTER, TREE OF KNOWLEDGE, WEBSTER'S NEW WORLD, and colophons  
are trademarks of Simon & Schuster.

Manufactured in the United States of America

3 4 5 6 7 8 9 10

Library of Congress Cataloging in Publication Data

0-671-41809-2 cl., indexed  
0-671-41807-6 cl., plain edge  
0-671-41811-4 Pbk.

taken ☆4. a slide or ride, as on a sled going down an incline by the force of gravity —vi. 1. to sail near or along a coast, esp. from port to port ☆2. to go down an incline on a sled ☆3. to continue in motion on momentum or by the force of gravity after propelling power has stopped ☆4. to continue without serious effort, letting one's past efforts carry one along —vt. 1. [Obs.] to go along the side of 2. to sail along or near the coast of —SYN. see SHORE! —the Coast [Colloq.] in the U.S., the Pacific coast —the coast is clear there is no apparent danger or hindrance

**coast-al** (-l) *adj.* of, at, near, or along a coast  
**coast artillery** artillery used to defend a coast  
**coast-er** (kōs'tər) *n.* 1. a person or thing that coasts 2. a ship that carries cargo or passengers from port to port along a coast ☆3. a sled or wagon for coasting 4. [obs. sense of *coast*, vi., "to pass close to or around"] formerly, a small tray, usually on wheels, for passing a wine decanter, etc. around a table 5. a small tray, mat, disk, etc. placed under a glass or bottle to protect a table or other surface  
**coaster brake** a brake in the hub of the rear wheel of a bicycle, operated by reversing the pressure on the pedals: it also releases the wheel from the driving mechanism to permit free coasting

**coast guard** 1. a governmental force employed to defend a nation's coasts, prevent smuggling, aid vessels in distress, maintain lighthouses, etc.; specif. [C-G-], such a branch of the U.S. armed forces, under the control of the Department of Transportation or, in time of war, of the Department of the Navy 2. a member of a coast guard —**coast guard-man**, **coast guard-woman**, *pl.* -men  
**coast-land** (kōst'land) *n.* land along a coast  
**coast-line** (-lin') *n.* the contour or outline of a coast  
**Coast Mountains** mountain range in W British Columbia & S Alas.: highest peak, 13,260 ft.

**Coast Ranges** series of mountain ranges along the W coast of N. America, extending from Alas. to Baja California: highest peak, Mount LOGAN

**coast-ward** (-wərd) *adj.*, *adv.* toward the coast: also **coast-wards** (-wərdz) *adv.*

**coast-wise** (-wiz') *adv.*, *adj.* along and near the coast: also **coast-ways** (-wāz') *adv.*

**coat** (kōt) *n.* [ME. & OFr. *colte*, a coat < ML. *cola*, a tunic < Frank. *kolla*, coarse cloth (akin to G. *kolze*, shaggy overcoat)] 1. a sleeved outer garment opening down the front and varying in length, as a suit jacket or a topcoat or overcoat 2. a natural outer covering of an animal, as of skin, fur, wool, etc. 3. the outer covering of a plant or of an animal structure or tissue 4. a layer of some substance, as paint, over a surface 5. [Dial.] a petticoat or skirt 6. [Obs.] customary garb of a profession, class, etc. —*vt.* 1. to provide or cover with a coat 2. to cover with a layer of something —**coat-ed** *adj.*

**coated paper** a paper whose surface has been treated to take halftone impressions or color printing

**Coates** (kōts), Eric 1886-1958; Eng. composer

**co-a-ti** (kō ā'tē) *n.*, *pl.* -tis [Tupi < *cua*, a cincture + *tim*, the nose: so called from appearance of its snout] any of a genus (*Nasua*) of small, flesh-eating, tree-dwelling mammals found in Mexico and Central and South America: it is similar to the raccoon but with a long, flexible snout

**co-a-ti-mon-di**, **co-a-ti-mon-di** (-mun'dē) *n.*, *pl.* -dis [Tupi < prec. + *mondi*, solitary] same as COATI

**coat-ing** (kōt'ing) *n.* 1. a coat or layer over a surface [a coating of enamel] 2. cloth for making coats

**coat of arms** [transl. of Fr. *colte d'armes*, light garment worn over armor, generally blazoned with heraldic arms] a group of emblems and figures (heraldic bearings) usually arranged on and around a shield and serving as the special insignia of some person, family, or institution

**coat of mail** *pl.* coats of mail [after Fr. *colte de mailles*, lit., coat of meshes] a suit of armor made of interlinked metal rings or overlapping plates

**coat-tail** (-tāl') *n.* the back part of a coat below the waist; esp., either half of this part when divided, as on a swallow-tailed coat —*ride* (or *hang*, etc.) *on* (someone's) *coat-tails* to have one's success dependent on that of someone else

**co-au-thor** (kō ā'thər) *n.* a joint author; collaborator  
**coax** (kōks) *vt.* [orig. slang, "to make a coax of" < obs. slang *coax*, *cox*, *cokes*, a fool, ninny] 1. to induce or try to induce to do something; (seek to) persuade by soothing words, agreeable manner, etc.; wheedle 2. to get by coaxing —*vi.* to use gentle persuasion, urging, etc. —**coax'er** *n.* —**coax-ing-ly** *adv.*

**SYN.** —**coax** suggests repeated attempts to persuade someone to do something and implies the use of soothing words, an insinuating manner, etc.; **cajole** suggests the use of flattery or other blandishments; **wheedle** implies even more strongly the use of subtle flattery or seduction in gaining one's ends

**co-ax-i-al** (kō āk'sē āl) *adj.* [CO- + AXIAL] 1. having a common axis: also **co-ax'al** 2. designating a compound loudspeaker consisting of a smaller unit mounted within and connected with a larger one on a common axis: the smaller unit reproduces the higher frequencies, beyond the range of

the larger ☆3. designating a high-frequency transmission line or cable in which a solid or stranded central conductor is surrounded by an insulating medium which, in turn, is surrounded by a solid or braided outside conductor in the form of a cylindrical shell: it is used for sending telephone, telegraph, television, etc. impulses

**cob** (kăb) *n.* [ME., prob. < LowG., as in Du. *kobbe* < Gmc. base \**kubb-*, something rounded] 1. [Brit. Dial.] a) a lump or small mass, as of coal b) a leader; chief ☆2. a corncock 3. a male swan 4. a short, thickset horse with a high gait  
**cob** (kăb) *n.* [prob. < EFr. *kobbe*] the great, black-backed gull (*Larus marinus*), found in the northern Atlantic regions: also *sp. cob*

**co-balt** (kō'bôlt) *n.* [G. *kobalt* < *kobold*, goblin, demon of the mines: term used by miners, who regarded it as worthless, from belief that goblins substituted it for silver] a hard, lustrous, steel-gray, ductile metallic chemical element, found in various ores: it is used in the preparation of alloys; its compounds are used in the production of inks, paints, and varnishes: symbol, Co; at. wt., 58.9332; at. no., 27; sp. gr., 8.71; melt. pt., 1495°C; boil. pt., 2900°C: a radioactive isotope (cobalt 60) is used in the treatment of cancer, in industrial radiography and research, etc.

**cobalt blue** 1. a dark blue pigment consisting of a mixture of cobalt and aluminum oxides 2. dark blue

**co-bal-tic** (kō'bôlt'ik) *adj.* 1. of cobalt 2. designating or of compounds in which cobalt has a valence of three

**co-bal-tite** (kō'bôlt'it) *n.* cobalt sulfarsenide, CoAsS, a silver-white mineral: also **co'balt-ine** (-tēn')

**co-bal-tous** (kō'bôlt'as) *adj.* designating or of compounds in which cobalt has a valence of two

**cob-ber** (kăb'ər) *n.* [prob. < Heb. (via Yid.) *chaver*, a comrade] [Australian Slang] a close companion; comrade

**Cob-bett** (kăb'it), William (pseud. *Peter Porcupine*) 1762?-1835; Eng. journalist & political reformer

**cob-ble** (kăb'l) *vt.* -bled, -bling [ME., prob. akin to *cob*] 1. to mend or patch (shoes, etc.) 2. to mend or put together clumsily or crudely

**cob-ble** (kăb'l) *n.* [prob. < *cob*] 1. a cobblestone 2. [*pl.*] same as COB COAL —*vt.* -bled, -bling to pave with cobblestones

**co-b-ler** (kăb'lər) *n.* [of U.S. orig. < ?] 1. an iced drink containing wine, whiskey, or rum, citrus fruit, sugar, etc. 2. a deep-dish fruit pie usually with a thick top crust of biscuit dough

**cob-ler** (kăb'lər) *n.* [ME. *cobelere*; see COBBLE] 1. a person whose work is mending shoes 2. [Archaic] a clumsy, bungling workman

**cob-ble-stone** (kăb'l'stōn) *n.* [ME. *cobel ston*; see COBBLE + *stone*] a rounded stone of a kind formerly much used for paving streets

**cob coal** [see *cob*] coal in large rounded lumps

**Cob-den** (kăb'dən), Richard 1804-65; Eng. political economist & statesman: advocate of free trade

**co-bel-lig-er-ent** (kō'bəl'ijər ənt) *n.* a nation associated but not formally allied with another or others in waging war

**Cob-ham** (kăb'əm), Lord see OLDCASTLE

**co-bi-a** (kō'bē ā) *n.* [C-G-] a large, voracious game fish (*Rachycentron canadum*) found in warm seas: it has a conspicuous black stripe along each side of the body

**co-ble** (kō'b'l) *n.* [ME. *cobel* < OE. *cuopel*, prob. < Celt., as in W. *ceubal*, Bret. *caubal* (whence? L. *caupulus*)] 1. a small fishing boat with a lug sail, deep stern, large rudder, and flatfish stern, used off the eastern coast of England 2. in Scotland, a short, flat-bottomed rowboat

**Co-blentz** (kō'b'lents) same as KOBLENZ

**cob-nut** (kăb'nūt) *n.* [see *cob*] same as FILBERT

**CO-BOL** (kō'bôl) [*co* (common) *business* -*oriented*] 1 (language) a digital computer language employing English words, used in business applications: also written *Cobol*

**co-bra** (kō'brā) *n.* [Port. *cobra* (de capello), serpent (of the hood) < L. *colubra*, a snake]

1. any of a genus (*Naja*) of very poisonous snakes of Asia and Africa having around the neck loose skin which is expanded into a hood when the snake is excited 2. leather made of the skin of this snake

**cobra de ca-pe-llo** (dē kā pel'ō) *pl.* cobras de capello [see prec.] a varicolored cobra (*Naja naja*), esp. of India, with a marking on the hood that looks like an eye

**Co-burg** (kō'bərg) city in N. Bavaria, Germany: pop. 46,000

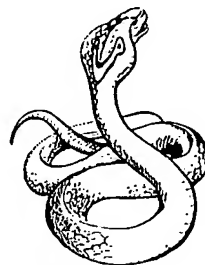
**cob-web** (kăb'web') *n.* [ME. *copweb* < *coppe*, spider (< OE. *coppe*, in *alorcoppe* < *ator*, poison + *-coppe*, spider) + *web*]

1. a web spun by a spider 2. a single thread of such a web 3. anything flimsy, gauzy, or ensnaring, like the web of a spider —*vt.* -webbed', -web-*bing* to cover with or as with cobwebs —**cob/web-by** *adj.*

**co-ca** (kō'ka) *n.* [Quechuan *caca*] 1. any of a family of tropical S. American shrubs, esp. a species (*Erythroxylon coca*) whose dried leaves are the source of cocaine and some other alkaloids 2. these dried leaves



COAT OF ARMS

INDIAN COBRA  
(to 6 ft. long)

**co-cal-ne**, crystalline leaves: it i  
**co-cain-lar** from excess  
**co-cain-lar** with coca  
**co-cal** (k by a (sp  
**co-cle** (-i  
**co-cl** (kă  
**co-clid** (kă  
 < Gr. *kô*  
 (Coccidae)  
**co-clid-lô**  
 ModL. *Co*  
 mycosis) s  
 by a lung  
 respiratory  
**co-clid-lô**  
 + -osis)  
 birds, and  
 (Coccidia)  
**co-clif-er**  
 < Gr. *kôk*  
**co-clid**  
 (specified  
**co-co-lit**  
 -LITH) a m  
 floating m  
**co-cus** (l  
 kokkos, a l  
 shape 2.  
 split whei  
**co-cus**  
 cocculus: us  
**co-cyx** (k  
 < Gr. *kô*  
 beak) a s  
 vertebral  
 vertebrae  
 (-sij'ē ā)  
**Co-cha-ba**  
 95,000  
**Co-chin** (l  
 of SW In  
 [ < *Cochin*  
 large dom  
 age and t  
**Cochin Cl**  
 in S Indo  
**coch-i-ne**  
 It. *coccin*  
 berry, sea  
 bodies of  
 coloring f  
**cochineal**  
 a brilliant  
 found ch  
 source of  
**coch-le-a**  
 cochlias,  
 shaped p  
 nerve end  
**coch-le-a**  
 prec.) sh  
**cock** (kăk  
 ON. *kôkr*  
 rooster b  
 the crow  
 woodcock  
 weatherc  
 ness or a  
 flow of a  
 position  
 turning u  
 (the cock  
 jauntily c  
 cocks his  
 4. a) to s  
 set (a trij  
 to be rele  
 to strike  
 [Archaic]  
**cock** (kăk  
 pile < IE  
 cone-sha  
**cock-ade**  
 semblanc  
 on the h  
**cock-a-d**  
 conventio  
**cock-a-b**  
 a crest)  
 conceite

fat, spē, c  
 e for a in  
 ū, Fr. du

confirmed —impose on (or upon) 1. [Rare] to make a strong impression on 2. to take advantage of; put to some trouble or use unfairly for one's own benefit 3. to cheat or defraud —im-pose'er n.

**im-pos-ing** (-pō'zīn) *adj.* making a strong impression because of great size, strength, dignity, etc.; impressive —*SYN.* see **GRAND** —im-pose-ing-ly *adv.*

**im-po-si-tion** (im'pō-si'zhən) n. [ME. < OFr. < L. *impositio*, a laying upon, application] 1. an imposing or imposing on; specif., a) the forcing of oneself, one's presence or will, etc. on another or others without right or invitation; obtrusion b) a taking advantage of friendship, etc. c) the laying on of hands, as in ordination or confirmation 2. something imposed; specif., a) a tax, fine, etc. b) an unjust burden or requirement c) a deception; fraud 3. the arrangement of type pages or plates in the proper order of printing

**im-pos-si-bil-i-ty** (im pās'a bil'a tē) n. [OFr. *impossibilitē* < LL. *impossibilitas*] 1. the fact or quality of being impossible 2. pl. -ties something impossible

**im-pos-si-ble** (im pās'a b'l) *adj.* [ME. < OFr. < L. *impossibilis*; see **IN-1** & **POSSIBLE**] 1. not capable of being, being done, or happening 2. not capable of being done easily or conveniently 3. not capable of being endured, used, agreed to, etc. because disagreeable or unsuitable (an impossible novel, an impossible request) —im-pose'si-ble-ness n. —im-pose'si-bly *adv.*

**im-post** (im'pōst) n. [OFr. < ML. *impostus* < L. *impositus*, pp. of *imponere*; see **IMPOSE**] 1. a tax; esp., a duty on imported goods 2. Racing the weight assigned to a horse in a handicap race —*vt.* to classify (imported goods) in order to assess the proper taxes

**im-post** (im'pōst) n. [Fr. *imposte* < It. *imposta* < L. *impositus*; see **PREC.**] the top part of a pillar, pier, or wall supporting an arch

**im-pos-tor** (im pās'tər) n. [Fr. *imposteur* < LL. *impostor* < pp. of L. *imponere*; see **IMPOSE**] a person who deceives or cheats others, esp. by pretending to be someone or something that he is not —*SYN.* see **QUACK**

**im-pos-tume** (-chōm, -tyōm) n. [Late ME. < MFr. < L. *apostema* < Gr. *apostēma*, lit., separation < *apostenai*, to stand off from; see **APOSTATE**] [Archaic] an abscess; also **im-pos'thume** (-thōm, -thyōm)

**im-pos-ture** (-chər) n. [Fr. < LL. *impostura*] the act or practice of an impostor; fraud; deception

**im-po-tence** (im'pō tans) n. [ME. < OFr. < L. *impotentia*] the quality or condition of being impotent; also **im-po-tency**, pl. -cies

**im-po-tent** (-tənt) *adj.* [ME. < OFr. < L. *impotens*; see **IN-1** & **POTENT**] 1. lacking physical strength; weak 2. ineffective, powerless, or helpless (*impotent* rage) 3. unable to engage in sexual intercourse, esp. because of an inability to have an erection 4. [Obs.] having no self-control —*SYN.* see **STERILE** —im-po-tent-ly *adv.*

**im-pound** (im pound) *vt.* 1. to shut up (an animal) in a pound 2. to take and hold (a document, evidence, etc.) in legal custody 3. to gather and enclose (water) for irrigation, etc. —im-pound-ment n.

**im-pov-er-ish** (im pāv'ər ish, -pāv'rish) *vt.* [ME. *empov-erishen* < extended stem of OFr. *empovir* < em- (< L. *in-*, in) + *povre* < L. *pauper*, POOR] 1. to make poor; reduce to poverty 2. to deprive of strength, resources, etc. —im-pov-er-ish-ment n.

**im-pow-er** (im pou'ər) *vt.* obs. var. of **EMPOWER**

**im-prac-ti-ca-ble** (im prak'ti kə b'l) *adj.* [*< IN-1* + **PRACTICABLE**] 1. not capable of being carried out in practice (an impracticable plan) 2. not capable of being used (an impracticable road) 3. [Now Rare] not capable of being managed or dealt with; intractable (an impracticable person) —im-prac-ti-ca-ble-ly *adv.*, im-prac'ti-ca-ble-ness n. —im-prac'ti-ca-bly *adv.*

**im-prac-ti-cal** (im prak'ti k'l) *adj.* not practical; specif., a) not workable or useful; impracticable b) not handling practical matters well c) given to theorizing; idealistic —im-prac'ti-cal-ly *adv.*, im-prac'ti-cal-ness n.

**im-pre-cate** (im'prə kāt) *vt.* -cat'ed, -cat'ing [*< L. imprecatus*, pp. of *imprecari*, to invoke, pray to < *in-*, in, on + *precari*, to PRAY] 1. to pray for or invoke (evil, a curse, etc.) 2. [Rare] to invoke evil upon; curse —*SYN.* see **CURSE** —im-pre-ca-tor n.

**im-pre-ca-tion** (im'prə kā'shən) n. [L. *imprecatio*] 1. the act of imprecating evil, etc. on someone 2. a curse —im-pre-ca-to'ry (-kə tōr'ē) *adj.*

**im-pre-cise** (im'pri sīs) *adj.* not precise, exact, or definite; vague —im-pre-cise-ly *adv.* —im-pre-ci'sion (-sizh'ən) n.

**im-preg-na-ble** (im'preg'nə b'l) *adj.* [ME. *imprenable* < OFr.: see **IN-1** & **PREGNABLE**] 1. not capable of being captured or entered by force 2. unshakable; unyielding; firm (an impregnable belief) —im-preg'na-ble-ly *adv.*

**im-preg-na-ble** (im'preg'nə b'l) *adj.* [**IMPREGN(ATE)** + **-ABLE**] that can be impregnated

**im-preg-nate** (im'preg'nāt; for *adj.* -nit) *vt.* -nat-ed, -nat-ing [*< LL. impraegnatus*, pp. of *impraegnare*, to make pregnant < L. *in-*, in + *praegnans*, PREGNANT] 1. to fertilize (an ovum) 2. to make pregnant 3. to fertilize (land); make fruitful 4. to fill or saturate; cause to be permeated/clothing impregnated with smoke/ 5. to indoc-trinate or imbue (with ideas, feelings, principles, etc.) —

*adj.* impregnated; pregnant —*SYN.* see **SOAK** —im'preg-na'tion n. —im-preg'na-tor n.

**im-pre-sa** (im prā'zə) n. [It.: see **FL.**] [Obs.] a device or emblem, usually with a motto

**im-pre-sa-ri-o** (im'prə sār'ē ō, -sēr'-) n., pl. -ri-os [It. < *impresa*, enterprise < *imprendere*, to undertake < VL. *\*imprehendere*; see **EMPRISE**] the organizer, manager, or director of an opera or ballet company, concert series, etc.

**im-pre-scrip-ti-ble** (im'pri skrip'tə b'l) *adj.* [Fr.: see **IN-1** & **PRESCRIPTIBLE**] that cannot rightfully be taken away, lost, or revoked; inviolable —im-pre-scrip'ti-bly *adv.*

**im-press** (im pres'; for n. im'pres) *vt.* [*< IN-1* + **PRESS**] 1. to draft or force (men) into public service, esp. into a navy 2. to levy, seize, or requisition (money, property, etc.) for public use —*n.* same as **IMPRESSION**

**im-press** (im pres'; for n. im'pres) *vt.* [ME. *impressen* < L. *impressus*, pp. of *imprimere*; see **IN-1** & **PRESS**] 1. to use pressure on so as to leave a mark (to impress clay with a die) 2. to mark by using pressure; stamp; imprint 3. to apply with pressure (to impress a die into clay) 4. a) to have a marked effect on the mind or emotions of b) to arouse the interest or approval of 5. to implant firmly on the mind or fix in the memory 6. Elec. to apply (a voltage or current) to a circuit or device, as from a generator —*n.* 1. the act of impressing 2. any mark, imprint, etc. made by pressure; stamp; impression 3. a distinctive quality or effect produced by some strong influence —*SYN.* see **AFFECT**

**im-press-i-ble** (-ə b'l) *adj.* [ML. *impressibilis*] that can be impressed; impressionable —im-press'i-ble-ly *adv.*

**im-pres-sion** (im presh'ən) n. [ME. *impressioun* < OFr. *impressio* < L. *impressio*] 1. the act of impressing 2. a result or effect of impressing; specif., a) a mark, imprint, etc. made by physical pressure b) an effect produced, as on the mind or senses, by some force or influence c) the effect produced by any effort or activity (hard cleaning made little impression on the stain) 3. a notion, feeling, or recollection, esp. a vague one 4. a first or single coat of paint or color 5. an imitation or mimicking intended as a caricature or amusing impersonation 6. Dentistry the imprint of the teeth and surrounding tissues in wax, plaster, etc., used as a mold in making dentures 7. Printing a) the pressing or pressure of type or plates on paper, etc.; printing b) a printed copy c) all the copies printed in a single operation from a set of unaltered type or plates —*SYN.* see **IDEA** —im-pres'sion-al *adj.*

**im-pres-sion-a-ble** (im presh'ən ə b'l) *adj.* [Fr.] easily affected by impressions; esp., capable of being influenced intellectually, emotionally, or morally; sensitive —im-pres'sion-a-ble-ly *adv.*

**im-pres-sion-ism** (-iz m) n. [*< Fr. impressionisme*, coined in 1874 after a Monet painting entitled "Impression, sunrise"] a theory and school of painting exemplified chiefly by Monet, Pissarro, and Sisley, but also by Manet, Renoir, etc., whose chief aim is to capture a momentary glimpse of a subject, esp. to reproduce the changing effects of light by applying paint to canvas in short strokes of pure color; the term has been extended to literature, as in the novels of the Goncourt brothers and in the novels of the symbolists, and to music, as by Debussy and Ravel, which seeks to produce moods and impressions by various characteristic devices

**im-pres-sion-ist** (-ist) n. 1. a painter, writer, or composer who practices impressionism 2. an entertainer who does impressions, or impersonations —*adj.* of impressionism or impressionists

**im-pres-sion-ist-ic** (im presh'ən is'tik) *adj.* 1. same as **IMPRESSIONIST** 2. conveying a quick or overall impression —im-pres'sion-ist-i-cal-ly *adv.*

**im-pres-sive** (im presh'iv) *adj.* having or tending to have a strong effect on the mind or emotions; eliciting wonder or admiration —im-pres'sive-ly *adv.*

**im-press-ment** (-mənt) n. [**IMPRESS** + **-MENT**] the practice or act of impressing men or property for the use or service of the public

**im-pres-sure** (im presh'ər) n. [**IMPRESS** + **-URE**] [Archaic] same as **IMPRESSION**

**im-prest** (im'prest) n. [It. *impresto*, a loan < (*dare*) *in prestito*, (to give) in loan < *in*, among + *prestilo*, a loan < *prestare*, to lend < L. *praestare*, to become surety for, lit., to stand before; *prae-*, before + *stare*, to STAND] a loan or advance of money, as from government funds —*adj.* Accounting designating a fund, as of petty cash, that is replenished in exactly the amount expended from it

**im-pri-ma-tur** (im'pri māt'ər, -māt'-) n. [ModL. lit., let it be printed, 3d pers. sing., pres. subj. pass., of L. *imprimere*; see **IMPRINT**] 1. license or permission to publish or print a book, article, etc.; specif., R.C.Ch. such permission granted by an ecclesiastical censor 2. any sanction or approval

**im-pri-mis** (im pri'mis) *adv.* [ME. *inprimis* < L. *in primis*, lit., among the first < *in*, among + *primis*, abl. pl. of *primus*, first; see **PRIME**] in the first place

**im-print** (im print'; for n. im'print) *vt.* [ME. *emprenten* < OFr. *empreinter* < *empreinte*, an imprint < pp. of *em-preindre* < L. *imprimere* < *in-*, on + *primere*, to PRESS] 1. to mark by or as by pressing or stamping; impress (to imprint a paper with a seal) 2. to make as a mark or impression 3. to press or apply (to imprint a kiss on the fore-

head/ 4. to —*n.* 1. a n characterist lisher's or i at the end c publication

**im-print-ir-nism** opeal a particule versible be stimulus in

**im-pris-on** 2. to restri ment n.

**im-prob-a-probable; r prob-a-bil'**

**im-pro-bi-l-L. improbi**

**im-promp-promptu, ir readiness - out prepai**

**im-promptu** SYN.—imp done on the spontaneity; as an adverb are now mor-tion, but hi applies to so and, with i ingenious u immediate n

**im-prop-er-proprius: s with the pu in accorda**

3. contrar: normal oi ness n.

**SYN.—impr** refers to any does not cor that which i (her unseem that which i

tar, etc. (hi decorous r behavior, s) indelicate modesty or that which (indecent) ex

**improper** less than i

**im-pro-pr-at'ed, -at are, to tak**

1. to tran: viduals o having be pro'pri-a'

**im-pro-pr-impropié** 1. the qu behavior "borrow"

**im-prove** < Anglo-J LL. *prode* of advan

good adv: to raise t to make ( construct: condition than, as

—**im-pro** SYN.—im of somethi supplying i seeking soi self/; ame tion to be worsen, li

**im-prove** improving increase i c) profita somethih of excelle

erty, as a **im-prov-i in-, not - PROVIDE** sight or ti

fat, āpe, ci e for a in u, Fr. duc



voting; decide against —vote in to elect —vote out to defeat (an incumbent) in an election —vote/less *adj.*  
**vot-er** (vōt'ər) *n.* a person who has a right to vote; elector, esp. one who actually votes  
**\*voting machine** a machine on which votes in an election are cast, registered, and counted  
**vo-tive** (vōt'iv) *adj.* [L. *volivus* < *volum*: see **VOTE**] 1. given, dedicated, consecrated, done, etc. in fulfillment of a vow or pledge [*volive* offerings] 2. *R.C.Ch.* designating or of a special or extraordinary Mass said at the priest's option  
**vouch** (vouch) *vt.* [M.E. *vouchen* < O.Fr. *vocher* < L. *vocare*, to call < *vox*, voice] 1. to uphold by demonstration or evidence 2. [Archaic] a) to attest, affirm, or guarantee b) to call as witness c) to cite (authority, books, etc.) in support of one's views or actions 3. in old English law, to call (a person) into court to give warranty of title —*vi.* 1. to give assurance, affirmation, or a guarantee (with *for*) [*to vouch for someone's honesty*] 2. to serve as evidence or assurance (*for*) [references *vouching* for his ability] —*n.* [Obs.] the act of vouching; assertion or attestation  
**vouch-er** (vou'chər) *n.* [substantive use of Anglo-Fr. *vouchier*, to vouch] 1. a person who vouches, as for the truth of a statement 2. a paper serving as evidence or proof; specif., a receipt or statement attesting to the expenditure or receipt of money, the accuracy of an account, etc.  
**vouch-safe** (vouch sáf') *vt.* -safed', -saf'ing [contr. of M.E. *vouchen safe*, to vouch as safe] to be gracious enough or condescend to give or grant [*to vouchsafe a reply*] —*vouch-safe-ment* *n.*  
**vous-soir** (vōō swā'r) *n.* [Fr. < O.Fr. *volsoir*, curvature of a vault < VL. *\*volitorium* < *\*volus*, for L. *volutus*, pp. of *volvere*, to roll; see **WALK**] *Archit.* any of the wedge-shaped stones of which an arch or vault is built  
**vow** (vou) *n.* [M.E. *vou* < O.Fr. < L. *volum*: see **VOTE**] 1. a solemn promise or pledge, esp. one made to God or a god, dedicating oneself to an act, service, or way of life 2. a solemn promise of love and fidelity [marriage *vows*] 3. a solemn affirmation or assertion —*vt.* 1. to promise solemnly 2. to make a solemn resolution to do, get, etc. 3. to declare emphatically, earnestly, or solemnly —*vi.* to make a vow —take *vows* to enter a religious order —*vow'er* *n.*  
**vow-el** (vou'al, vou'l) *n.* [M.E. *vowelle* < M.Fr. *vowel* < L. *vocalis* (*littera*), vocal (letter), vowel < *vox*, voice] 1. a voiced speech sound characterized by generalized friction of the air passing in a continuous stream through the pharynx and opened mouth but with no constriction narrow enough to produce local friction; the sound of the greatest prominence in most syllables 2. a letter, as *a*, *e*, *i*, *o*, *u*, and sometimes *y*, representing such a sound Cf. **CONSONANT** —*adj.* of a vowel or vowels  
**vow-el-ize** (vou'ə liz') *vt.* -ized', -iz'ing to add vowel points to [*to vowelize a Hebrew text*] —*vow-el-i-za-tion*, *n.*  
**vowel point** in certain languages whose written form normally consists only of consonants, as Hebrew, a diacritical mark accompanying a consonant (to indicate the following vowel sound) or a neutral letter (to indicate an initial vowel sound)  
**vox** (vōks) *n., pl.* vo-ces (vō'sēz) [L.] voice  
**vox an-ge-li-ca** (an jel'i kə) [L., lit., angelic voice] *same as* VOIX CELESTE  
**vox hu-ma-na** (hyōō mā'nə, -mān'ə) [L., human voice] a reed organ stop with very short pipes in which only the higher harmonics are reinforced  
**vox po-pu-li** (pāp'yoo lī') [L.] the voice of the people; public opinion or sentiment: abbrev. *vox pop.*  
**voy-age** (voi'ij) *n.* [M.E. *viage* < O.Fr. *viage*, a voyage < L. *viaticum*, provision for a journey < *viaticus*, of a journey < *via*, way, journey: see **VIA**] 1. a relatively long journey or passage by water or, formerly, by land 2. a journey by aircraft or spacecraft 3. a written account of a voyage 4. [Obs.] a project; enterprise —*vi.* -aged, -ag-ing to make a voyage; travel —*vt.* to sail or travel over or on —*SYN.* see **TRIP** —*voy-ag-er* *n.*  
**vo-yā-geur** (vōyā zhēr') *n., pl.* -geurs' (-zhēr') [Fr., a traveler] in Canada, 1. formerly, a person who transported goods and men by boat to trading posts for the fur companies 2. any woodsman or boatman of the Canadian wilds  
**Voy-ag-eurs National Park** (voi'ij ərz) [after *prec.*] national park in a lake region of northernmost Minn., on the border of Ontario, Canada: 343 sq. mi.  
**vo-year** (vōy yur', voi ur') *n.* [Fr. < *voir*, to see < L. *videre*: see **VISION**] a person who has an exaggerated interest in viewing sexual objects or activities to obtain sexual gratification; peeping Tom —*vo-year'ism* *n.* —*vo-year-is'tic* *adj.*  
**V.P., VP** Vice-President  
**V.R.** [L. *Victoria Regina*] Queen Victoria  
**V.Rev.** Very Reverend  
**vroom** (vrōōm) *n.* [echoic] any of the sounds made by a motor vehicle in accelerating —*vi.* [Colloq.] to make, or move off with, such sounds  
**vs.** versus  
**V.S.** Veterinary Surgeon  
**v.s.** [L. *vide supra*] see above  
**V sign** [*V* (*ictory*)] a gesture made by raising the hand with the middle and index fingers separated to form a V, showing a wish for victory or success or expressing approval  
**V.S.O.** very superior (or special) old: of brandy

**V.S.O.P.** very superior (or special) old pale: of brandy  
**vss.** versions  
**\*V/STOL** [*v* (*ertical* or) *s* (*hort*) *t* (*ake*) *o* (*ff* and) *l* (*anding*)] an aircraft that can take off and land either vertically or on a short airstrip  
**VT** variable time  
**Vt.** Vermont  
**vt., vt.** transitive verb  
**\*VTOL** [*v* (*ertical*) *t* (*ake*) *o* (*ff* and) *l* (*anding*)] an aircraft, usually other than a helicopter, that can take off and land vertically  
**VTR** video tape recorder  
**VU** volume unit  
**vug, vugg, vugh** (vug, voog) *n.* [Corn. *vooga*, a cave] Mining a cavity or hollow in a rock or lode, often lined with crystals —*vug'gy* *adj.* -gl'er, -gl'est  
**Vuil-lard** (vūē yār') *n.* Jean Édouard (zhān ā dwār') 1868-1940; Fr. painter  
**Vul-can** (vul'kən) [L. *Vulcanus*, *Volcanus*] *Rom. Myth.* the god of fire and of metalworking; later identified with the Greek god Hephaestus  
**Vul-ca-ni-an** (vul kā'nē ən) *adj.* [L. *Vulcanius*, of Vulcan] 1. of, characteristic of, associated with, or made by, Vulcan 2. [-v] having to do with metalworking 3. [-v] *Geol.* a) *same as* **VOLCANIC** b) of or pertaining to a volcanic explosion emitting a large cloud of gases bearing fine ash and a mass of viscous lava that hardens in the air  
**vul-can-ism** (vul'kə niz'm) *n.* *same as* **VOLCANISM**  
**vul-can-ite** (-nit') *n.* [**VULCAN** + *-ite*] a hard rubber made by treating crude rubber with a large amount of sulfur and subjecting it to intense heat; ebonite: used in combs, electrical insulation, etc.  
**vul-can-i-za-tion** (vul'kan i zā'shən) *n.* [*< ff.* + *-ATION*] 1. the process of treating crude rubber with sulfur or its compounds and subjecting it to heat in order to make it nonplastic and increase its strength and elasticity 2. a process somewhat like this, for hardening some substance  
**vul-can-ize** (vul'kə niz') *vt.* -ized', -iz'ing [**VULCAN** + *-ize*] to subject to vulcanization —*vi.* to undergo vulcanization —*vul-can-iz'er* *n.*  
**vul-can-ol-o-gy** (vul'kə nāl'ə jē) *n.* *same as* **VOLCANOLOGY**  
**Vulg.** Vulgate  
**vul-gar** (vul'gər) *adj.* [M.E. < L. *vulgaris* < *vulgus*, *volgus*, the common people < IE. base *\*wel-*, to crowd, throng, whence Gr. *eilein*, to press, swarm] 1. of, characteristic of, belonging to, or common to the great mass of people in general; common; popular [*a vulgar superstition*] 2. designating, of, or in the popular, or vernacular, speech 3. a) characterized by a lack of culture, refinement, taste, restraint, sensitivity, etc.; coarse; crude; boorish b) indecent or obscene —*n.* 1. [Archaic] the common people (with *the*) 2. [Obs.] the vernacular —*SYN.* see **COARSE**, **COMMON** —*vul'gar-ly* *adv.*  
**vulgar fraction** *same as* **COMMON FRACTION**  
**vul-gar-i-an** (vul ger'ē ən, -gar'ē) *n.* a vulgar person; esp., a rich person with coarse, ostentatious manners or tastes  
**vul-gar-ism** (vul'gər iz'm) *n.* 1. a word, phrase, or expression that is used widely but is regarded as nonstandard, unrefined, coarse, or obscene 2. vulgar behavior, quality, etc.; vulgarity  
**vul-gar-i-ty** (vul gar'ə tē) *n.* [LL. *vulgaritas*] 1. the state or quality of being vulgar, crude, coarse, unrefined, etc. 2. *pl.* -ties a vulgar act, habit, usage in speech, etc.  
**vul-gar-i-za-tion** (vul'gə ri zā'shən) *n.* 1. the act or an instance of making something, as abstruse or highly technical information, more readily intelligible or widely known 2. the act or an instance of making vulgar, coarse, unrefined, obscene, etc.  
**vul-gar-ize** (vul'gə riz') *vt.* -ized', -iz'ing 1. to cause to be more widely known, more easily understood, etc.; popularize 2. to make vulgar, coarse, unrefined, obscene, etc. —*vul'gar-iz'er* *n.*  
**Vulgar Latin** the everyday speech of the Roman people, from which the Romance languages developed; popular Latin as distinguished from standard or literary Latin  
**Vul-gate** (vul'gāt, -git) *n.* [ML. *vulgata* (*editio*), popular (edition) < L. *vulgatus*, common, usual, orig. pp. of *vulgare*, to make common < *vulgus*: see **VULGAR**] 1. a Latin version of the Bible prepared by St. Jerome in the 4th cent., serving as an authorized version of the Roman Catholic Church 2. [-v] a) any text or version in common acceptance b) the vernacular, or common speech —*adj.* 1. of or in the Vulgate 2. [-v] commonly accepted; popular; specif., of or in the vernacular, or common speech  
**vul-ner-a-ble** (vul'nər ə b'l) *adj.* [LL. *vulnerabilis*, wounding, likely to injure (also, in pass. sense, vulnerable) < L. *vulnerare*, to wound < *vulnus* (gen. *vulneris*), a wound < IE. base *\*wel-*, to tear, wound, whence OE. *wæl*, carnage; cf. **VALKYRIE**] 1. that can be wounded or physically injured 2. a) open to criticism or attack [*a vulnerable reputation*] b) easily hurt, as by adverse criticism; sensitive c) affected by a specified influence, temptation, etc. [*vulnerable to political pressure*] 3. open to attack by armed forces 4. *Bridge* liable to increased penalties and entitled to increased bonuses: said of a team which has won one game —*vul'ner-a-bil'i-ty* *n.* —*vul'ner-a-bly* *adv.*  
**vul-ner-ar-y** (vul'nər ə r'ē) *adj.* [L. *vulnerarius* < *vulnus*, a wound: see *prec.*] used for healing wounds —*n., pl.* -ar'ies any vulnerary drug, plant, etc.

**vul-pine**  
a fox] 1  
**vul-ture**  
tear: for  
ABLE] 1.  
birds (fa:  
to the e  
naked,  
head an  
feed chi  
and are l  
perate r  
KEY BU  
ruthless  
others  
**vul-tur-i**  
[L. *vultu*  
1. of th  
charact  
or vultu  
**vul-tur-**  
**vul-va** (

W, w (c  
letter c  
in Ang  
A.D., i  
in the  
Norma  
in Eng  
contin  
diphth  
answer  
W or i  
group  
W or i  
in a se  
W (w/c  
W, w v  
W, W.,  
W. 1.  
W, w.  
width  
w. 1.  
W.A. V  
Waadt  
WAAF  
Waal  
west i  
Rhine  
Wa-bz  
Quadr  
W Ol  
wab-b  
WAC  
WAC  
Wace  
icler:  
wack  
pl. -o  
wack-  
-y': c  
-wa  
Wa-c  
Tex.,  
wad'  
soft:  
etc.  
wad  
rial  
hem-  
firm  
tridg  
larg  
com  
3. a)  
into  
5. t  
wad'  
Wad'  
fat, 3  
a for  
ü, F